



Sheet 1 of 3

U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE FORM PTO-1449 ATTY, DOCKET NO. SERIAL NO. 09/647,946 1038-1094 MIS:ac INFORMATION DISCLOSURE STATEMENT BY APPLICANO 1 P APPLICANT Robert C. Brunham SEP 0 5 2001 GROUP TECH CENTER 1600/2900 FILING DATE December 6, 2000

U.S. PATENT DOCUMENTS

INITIAL	DOCUMENT N	O. DATE	NAME	CLASS	SUBCL.	FILING DATE
WY	5,589,466	Dec/96	Felgner et al.			

FOREIGN PATENT DOCUMENTS

	REF	DOCUMENT NUMBER	DATE	COUNTRY	CLASS	SUBCLASS	TRAN	SLATION	
							YES	NO	
00		WO 98/02546	Jan-22-98	PCT	C12N	15/31			
1/077		0 192 033 A2		EP					
1001					= ====				
				ling Author, Title, Date, P	_	es, Etc.)			
0.1		1. Donnelly et al, A	nn. N.Y. Acad	. Sci. 772 (1995) pages	40-46		*		
1790		2. D. M. Pardoll and	A. M. Becker	ieg, Immunity 3, 165-16	9 (1995);				
VY	3. W.M. McDonnell and F. K. Askari, N. Engl. J. Med. 334, 42-45 (1996)								
/		4. J. B. Ulmer et al	., Science 259), 1745-1749 (1993);					
		5. B. Wang et al., F	Proc. Natl. Aca	d Sci. USA 90,4156 (1993);				
		6. G. J. M. Cox, T.	J. Zamb, L.A. E	Babiuk, J. Virol. 67, 5664	1-5667(199	3);			
	7. E. Raz et al., Proc. Natl.Acad. Sci. USA, 91,9519 –9523(1994);								
	8. Z. Q. Xiang et al., Virology 199, 132-140 (1994);								
	9. J.J.Donnelly et al., J. Infect. Dis. 713, 314-320 (1996); 10. D. L. Montgomery et al., DNA. Cell. Biol. 12, 777-783 (1993); 11. J.J. Donnelly et al., Nature Medicine 1, 583-587 (1995);								
		12. G. H. Rhodes et al., Dev. Biol.Stand. 82, 229 (1994);							
		13. H. L. Davis, M.	L Michel, R.	G. Whalen, Human Mo	ecular Gen	etics 2, 1847 -	1851 (199	3)	
		14. J. B. Ulmer et a	I., Vaccine 12,	1541-1544 (1994)					
		15. E. F. Fynan et a	I, Proc. Natl. A	Acad. Sci. USA 90, 114	78-11482 (1993)			
	16. E. Manickan, R. J. D. Rouse, Z. Yu, J. Immunol. 155, 259-265 (1995)								
		17. M. Sedegah, R.	Hedstorm, P.	Hobart, S. L. Hoffman, F	Proc. Natl. A	Acad. Sci. USA	91, 9866-	9870	
		(1994)							

RP Swart

8-9-04



18. M.A. Barry, W.C. Lai, S.A. Johnston, Nature 377, 632-635 (1995) 19. D. Xu and F. Y. Liew, Vaccine 12, 1534 –1536 (1994) 20. D. B. Lowrie, R.E. Tascon, M. J. Colston, Vaccine 12, 1537-1540 (1994). 21. J. W. Moulder, Microbiol. Rev. 55, 143-190 (1991) 22. J. Schachter, Curr. Top. Microbiol. Immunol, 138, 109 (1988) 23. S. D. Hillis and J. N. Wasserheit, N. Engl. J. Med. 334, 1399-1401 (1996) 24. R. C. Brunham and R. W. Peeling, Infectious Agents and Disease 3, 218-233 (1994) 25. T. Grayston and S-P. Wang, Sex Trans. Dis. 5, 73-77 (1978) 26. J.T. Grayston and S-P. Wang, Sex Trans. Dis. 5, 73-77 (1978) 27. H. R. Taylor, J. Whittum-Hudson, J. Schachter, Invest. Ophthalmol. Vis. Sci. 29, 1847-1853 (1988) 28. B.E. Batteiger, R. G. Rank, P.M. Bavoit, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al., Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T. W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y. X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feitzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igletseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igletseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984) 39. G. Tipples and G. McClarty, J. Biol. Chem. 270, 7908-7914 (1995)
23. S. D. Hillis and J. N. Wasserheit, N. Engl. J. Med. 334, 1399-1401 (1996) 24. R. C. Brunham and R. W. Peeling, Infectious Agents and Disease 3, 218-233 (1994) 25. T. Grayston and SP. Wang, Sex Trans. Dis. 5, 73-77 (1978) 26. J.T. Grayston and SP Wang, J. Infect. Dis. 132, 87-105 (1975) 27. H. R. Taylor, J. Whittum-Hudson, J. Schachter, Invest. Ophthalmol. Vis. Sci. 29, 1847-1853 (1988) 28. B.E. Batteiger, R. G. Rank, P.M. Bavoil, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al., Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg. Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
23. S. D. Hillis and J. N. Wasserheit, N. Engl. J. Med. 334, 1399-1401 (1996) 24. R. C. Brunham and R. W. Peeling, Infectious Agents and Disease 3, 218-233 (1994) 25. T. Grayston and SP. Wang, Sex Trans. Dis. 5, 73-77 (1978) 26. J.T. Grayston and SP Wang, J. Infect. Dis. 132, 87-105 (1975) 27. H. R. Taylor, J. Whittum-Hudson, J. Schachter, Invest. Ophthalmol. Vis. Sci. 29, 1847-1853 (1988) 28. B.E. Batteiger, R. G. Rank, P.M. Bavoil, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al., Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
23. S. D. Hillis and J. N. Wasserheit, N. Engl. J. Med. 334, 1399-1401 (1996) 24. R. C. Brunham and R. W. Peeling, Infectious Agents and Disease 3, 218-233 (1994) 25. T. Grayston and SP. Wang, Sex Trans. Dis. 5, 73-77 (1978) 26. J.T. Grayston and SP Wang, J. Infect. Dis. 132, 87-105 (1975) 27. H. R. Taylor, J. Whittum-Hudson, J. Schachter, Invest. Ophthalmol. Vis. Sci. 29, 1847-1853 (1988) 28. B.E. Batteiger, R. G. Rank, P.M. Bavoil, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al., Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
23. S. D. Hillis and J. N. Wasserheit, N. Engl. J. Med. 334, 1399-1401 (1996) 24. R. C. Brunham and R. W. Peeling, Infectious Agents and Disease 3, 218-233 (1994) 25. T. Grayston and SP. Wang, Sex Trans. Dis. 5, 73-77 (1978) 26. J.T. Grayston and SP Wang, J. Infect. Dis. 132, 87-105 (1975) 27. H. R. Taylor, J. Whittum-Hudson, J. Schachter, Invest. Ophthalmol. Vis. Sci. 29, 1847-1853 (1988) 28. B.E. Batteiger, R. G. Rank, P.M. Bavoil, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al., Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
24. R. C. Brunham and R. W. Peeling, Infectious Agents and Disease 3, 218-233 (1994) 25. T. Grayston and S-P. Wang, Sex Trans. Dis. 5, 73-77 (1978) 26. J.T. Grayston and SP Wang, J. Infect. Dis. 132, 87-105 (1975) 27. H. R. Taylor, J. Whittum-Hudson, J. Schachter, Invest. Ophthalmol. Vis. Sci. 29, 1847-1853 (1988) 28. B.E. Batteiger, R. G. Rank, P.M. Bavoil, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al., Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
25. T. Grayston and S-P. Wang, Sex Trans. Dis. 5, 73-77 (1978) 26. J.T. Grayston and SP Wang, J. Infect. Dis. 132, 87-105 (1975) 27. H. R. Taylor, J. Whittum-Hudson, J. Schachter, Invest. Ophthalmol. Vis. Sci. 29, 1847-1853 (1988) 28. B.E. Batteiger, R. G. Rank, P.M. Bavoil, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al., Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
26. J.T. Grayston and SP Wang, J. Infect.Dis. 132, 87-105 (1975) 27. H. R. Taylor, J. Whittum-Hudson, J. Schachter, Invest. Ophthalmol. Vis. Sci. 29, 1847-1853 (1988) 28. B.E. Batteiger, R. G. Rank, P.M. Bavoil, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al., Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
27. H. R. Taylor, J. Whittum-Hudson, J. Schachter, Invest. Ophthalmol. Vis. Sci. 29, 1847-1853 (1988) 28. B.E. Batteiger, R. G. Rank, P.M. Bavoil, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al.,Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
28. B.E. Batteiger, R. G. Rank, P.M. Bavoil, J. Gen. Microbiol. 139, 2965-2972 (1993) 29. M. Campos et al.,Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
29. M. Campos et al.,Invest. Ophthalmol. Vis. Sci. 36, 1477-1491 (1995) 30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
30. H. Su, M. Parne, H. D. Caldwell, Vaccine 13, 1023 –1032 (1995) 31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
31. T W. Tan, A.J. Herring, I. E. Anderson, Infect. Immun. 58, 3101-3108 (1990) 32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
32. M. Tuffrey, F. Alexander, W. Conlan, J. Gen. Microbiol. 138, 1707-1715 (1992) 33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
33. Y X. Zhang, J. G. Fox, Y. Ho, Mol. Biol. Evol. 10, 1327-1342 (1993) 34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
34. R. P. Morrison, K. Feilzer, D. B. Tumas, Infect. Immun. 63, 4661-4668 (1995) 35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
35. H. Su and H. D. Caldwell, Infect. Immun. 63, 3302-3308 (1995) 36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
36. J. U. Igietseme et al., Reg.Immunol. 5, 317 –324 (1993) 37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
37. J. U. Igietseme and R. G. Rank, Infect. Immun. 59, 1346-1351 (1991) 38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
38. D. M. Williams, J. Schachter, J.J. Coalson, J. Infect. Dis. 149, 630-639 (1984)
39. G. Tipples and G. McClarty, J. Biol. Chem. 270, 7908-7914 (1995)
40. X. Yang, K. T. HayGlass, R. C. Brunham, J. Immunol., 156, 4338-4344 (1996)
41. H. Su and H. D. Caldwell, Infect. Immun. 63, 946-953 (1995)
42. A. S. McWilliam, D. Nelson, J.A. Thomas, J. Exp. Med. 179, 1331-1336 (1994)
43. M. R. Neutra, E. Pringault, JP. Kraehenbuhl, Annu. Rev. Immunol. 14, 275-300 (1996)
44. J.M. Austyn, J. Exp. Med. 183, 1287-1292 (1996)
45. R. Brunham et al., J. Clin. Invest. 94(1), 458-463 (1994)
46. R. C. Brunham et al., J. Infect. Dis. 173 950-956 (1996)
47. Tang et al., Nature 1992, 356: 152-154
48. Furth et al. Vaccine 1994, 12. 1503-1509.

MSwant 8-9-04



RECEIVED

SEP 0 5 2001	3 TECH CENTED 16 49. Morrison RP, Manning DS, Caldwell HD, Immunology of Chlamydia trachomatis infections. TEN 1000/2 Immunoprotective and immunopathogenetic responses. In: Quin TC, Advances in host defence.					
ADEL!	49. Morrison RP, Manning DS, Caldwell HD. Immunology of Chlamydia trachomatis infections. Immunoprotective and immunopathogenetic responses. In: Quin TC. Advances in host defence mechanisms. Sexually transmitted diseases. Vol. 8. New York: Raven Press, 1992: 57-84					
99	50. Xiang Z. Ertl HCJ. Manipulation of the immune response to a plasmid-encoded viral antigen by coinoculation with plasmids expressing cytokines. Immunity 1995: 2:129-35					
	51. Holland M. J. et al., Synthetic peptides based on Chlamydia trachomatis antigens identify cytotoxic T lymphocyte responses in subjects from a trachoma-endemic population. Clin. Exp. Immunol 1997 Jan; 107 (1): 44-49.					
	52. Su, H. et al, Identification and characterization of T-helper cell epitopes of the major outer membrane protein of Chlamydia trachomatis, J. Exp.Med. 1990 July 1: 172 (1): 203-212					
	53. Su, H et al, Immunogenicity of a chimeric peptide corresponding to T helper and B cell epitopes of the Chlamydia trachomatis mmajor outer membrane protein, J. Exp. Med. 1992, Jan.1; 175 (1): 227-235					
	54. Allen, J. E. et al A single peptide from the major outer membrane protein of Chlamydia trachomatis elicits T cell help for the production of antibodies to production of antibodies to protective determinants. J. Immunol. 1991, July 15; 147 92; 674-679.					
	55. Davis et al. Vaccine 1994; 12:1503-1509.					
	56. Lopez-Macia et al., "Induction of Antibodies against Solmonella typhi OmpC Porin by naked DNA immunization" ANNALS OF THE NEW YORK ACADEMY OF SCIENCE, vol. 772, 1995, pp. 129-135					
	57. Liu, M.A. et al., N.Y. Acad. Sci. 772 (1995).					
	58. Knight, S.C. et al. A peptide of Chlamydia trachomatis shown to be a primary T-cell epitope in vitro induces cell-mediated immunity in vivo. PMID: 1712817, UI:91302820, Immunology 1995, May 15, 85(1), pages 8-15					
	59. Zhang Dong-Ji. et al. Intramuscular Immunization. 1997, pp. 113-117.					
	60. Barnet LouAnn, et al., Journal of neuroimmunology 64 (1996) 163-173.					
	61. Douglas A. and Hatch P. T., Journal of Biology 1996. P. 5573-5578.					
	62. Baxby D. and Paoletti E. Vaccine Vol. 10, 1992. Pp. 8-9					
	63. Chen Z. et al. Vaccine Research Vol. 4, 1995, p. 135-144.					
	64. Brunham C. R. et al. Transgene as vaccine for chlamydia.1999; 138:S519-S522.					
	65. Robinson L. Harriet, Vaccine 1997 Vol. 15 pp. 785-787.					
	66. McCluskie, J.M. et al. Molecular Medicine 5: 287-300. 1999.					
	67. Green S. et al. Liposomal Vaccine. Vol. 383 : pp. 83-92					
U						
$ \Omega$ 1						
EXAMINER:	Swart DATE CONSIDERED: 8-9-04					

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if in conformance and not considered. Include copy of this form with next communication with applicant.

* Will follow shortly